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EXAMINER

THANGAVELU, KANDASAMY

ART UNIT	PAPER NUMBER
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2123

DATE MAILED: 07/28/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/580,700

Applicant(s)

SWIFT, LARRY

Examiner

Kandasamy Thangavelu

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 06 June 2005.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-41 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-41 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 30 May 2000 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. This communication is in response to the Applicant's Response mailed on June 6, 2005. Claims 1-41 of the application are pending. This office action is made non-final in response to request for continued Examination.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the first paragraph of 35 U.S.C. §112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

3. Claims 1-35 are rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

Claim 1 states in part, "means for presenting and displaying each of said plurality of performance parameters in association with the corresponding summary period". The specification does not describe anywhere the "corresponding summary period" associated with each of the plurality of performance parameters. Therefore it is not understood as to what the

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applicant means by “corresponding summary period” for each of the plurality of performance parameters.

Claim 12 states in part, “a data presentation module, wherein said module presents each of said plurality of processed performance parameters in association with the corresponding summary period”. The specification does not describe anywhere the “corresponding summary period” associated with each of the plurality of processed performance parameters. Therefore it is not understood as to what the applicant means by “corresponding summary period” for each of the plurality of processed performance parameters.

Claim 23 states in part, “presenting each of said plurality of performance parameters in association with the corresponding summary period”. The specification does not describe anywhere the “corresponding summary period” associated with each of the plurality of performance parameters.

Claim 34 states in part, “presenting each of said plurality of performance parameters in association with the corresponding summary period”. The specification does not describe anywhere the “corresponding summary period” associated with each of the plurality of performance parameters.

Claims rejected but not specifically addressed are rejected based on their dependency on rejected claims.

Claim Interpretations

4. In claim 1, “means for presenting and displaying each of said plurality of performance parameters in association with the corresponding summary period” is interpreted as “means for presenting and displaying each of said plurality of performance parameters in association with the summary period”.

In claim 12, “a data presentation module, wherein said module presents each of said plurality of processed performance parameters in association with the corresponding summary period” is interpreted as “a data presentation module, wherein said module presents each of said plurality of processed performance parameters in association with the summary period”.

In claim 23, “presenting each of said plurality of performance parameters in association with the corresponding summary period” is interpreted as “presenting each of said plurality of performance parameters in association with the summary period”.

In claim 34, “presenting each of said plurality of performance parameters in association with the corresponding summary period” is interpreted as “presenting each of said plurality of performance parameters in association with the summary period”.

Claim Rejections - 35 USC § 102

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(e) the invention was described in-

(1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effect under this subsection of a national application published under section 122(b) only if the international application designating the United States was published under Article 21(2)(a) of such treaty in the English language; or

(2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that a patent shall not be deemed filed in the United States for the purposes of this subsection based on the filing of an international application filed under the treaty defined in section 351(a).

6. Claims 1, 2, 8-10, 12, 13, 19-21, 23, 24, 30-32 and 34-41 are rejected under 35

U.S.C. 102(e) as being anticipated by **Engel et al.** (U.S. Patent 6,320,585).

6.1 **Engel et al.** teaches Displaying resource performance and utilization information.

Specifically, as per Claim 1, **Engel et al.** teaches a system for determining and predicting performance of a communication device (CL1, L54 to CL2, L5; CL2, L14-29; CL9, L5-6); comprising:

means for specifying a report period, the report period corresponding to a reporting period of interest (CL2, L14-29; CL8, L20-23; CL9, L2-6; reporting period = baseline period = 3-6 weeks);

means for specifying a plurality of summary periods, each summary period corresponding to a different portion of the reporting period (CL1, L54 to CL2, L5; CL2, L32-39; CL5, L8-15; CL6, L13-21; summary period = preselected period = e.g., a day); and wherein each

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summary period corresponds to a plurality of days of interest (CL8, L20-22) and to a portion of the days of interest, and wherein the portion is less than a day (CL5, L8-15; CL6, L13-21); and specified by the times of the day that are of interest (CL2, L32-39; CL5, L8-15; CL6, L13-21);

means for processing a retrieved plurality of selected data parameters into a plurality of actual performance parameters corresponding to actual performance of the communication device during each of the summary periods (CL1, L54 to CL2, L5; CL2, L32-39; Fig. 2; CL5, L56-59; CL5, L8-15); and a plurality of trend parameters to predict future performance of the communication device (CL9, L5-6; CL9, L16-54; Fig 11; CL9, L55 to CL10, L3); and

means for presenting and displaying each of the plurality of performance parameters in association with the corresponding summary period (CL1, L54 to CL2, L5; CL2, L32-39; Fig. 2; CL5, L8-15; CL7, L56-59), and for presenting and displaying the plurality of trend parameters associated with the report period, in a trend report (CL2, L27-29; CL6, L22-36; CL8, L47-57; Fig 11; CL9, L55 to CL10, L3).

Per Claim 2: **Engel et al.** teaches a means for recommending a performance rating based upon the plurality of trend parameters (CL2, L21-29; Fig. 11; CL9, L55 to CL10, L3).

Per Claim 8: **Engel et al.** teaches that the processing means determines the plurality of trend parameters using a statistical regression algorithm (CL9, L26-54; Fig. 11; CL9, L55 to CL10, L3).

Per Claim 9: **Engel et al.** teaches that the statistical regression algorithm is a linear regression algorithm (CL9, L26-54; Fig. 11; CL9, L55 to CL10, L3).

Per Claim 10: **Engel et al.** teaches that the processing means further process the plurality of trend parameters to predict the time at which capacity of the communication device should be changed (CL2, L21-29; Fig. 11; CL9, L55 to CL10, L3; Fig. 10).

6.2 As per Claim 12, **Engel et al.** teaches a system for determining and predicting performance of a communication device (CL1, L54 to CL2, L5; CL2, L14-29; CL9, L5-6); comprising:

- a data poller, wherein the data poller collects a plurality of data parameters from the communication device (CL8, L22-25);

- a database which stores the data parameters (CL8, L25-34);

- a user interface, wherein a user specifies a report period, the report period corresponding to a reporting period of interest (CL2, L14-29; CL8, L20-23; CL9, L2-6; reporting period = baseline period = 3-6 weeks); and the user specifies a plurality of summary periods, each summary period corresponding to a different portion of the reporting period (CL1, L54 to CL2, L5; CL2, L32-39; CL5, L8-15; CL6, L13-21; summary period = preselected period = e.g., a day); and wherein each summary period corresponds to a plurality of days of interest (CL8, L20-22) and to a portion of the days of interest, and wherein the portion is less than a day (CL5, L8-15; CL6, L13-21); and specified by the times of the day that are of interest (CL2, L32-39; CL5, L8-15; CL6, L13-21);

- a processor, wherein the processor retrieves a plurality of selected data parameters from the database such that the plurality of selected data parameters corresponds to the plurality of summary periods (CL8, L25-34; CL8, L37-38; CL8, L47-58); and wherein the processor

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processes the plurality of selected data parameters into a plurality of performance parameters which correspond to actual performance of the communication device during each of the summary periods (CL1, L54 to CL2, L5; CL2, L32-39; Fig. 2; CL5, L56-59; CL5, L8-15); and wherein the processor trends the plurality of performance parameters into a plurality of trend parameters to predict future performance of the communication device (CL9, L5-6; CL9, L16-54; Fig 11; CL9, L55 to CL10, L3);

a data presentation module, wherein the module presents each of the plurality of processed performance parameters in association with the corresponding summary period and the plurality of trend parameters in a trend report (CL1, L54 to CL2, L5; CL2, L27-29; Fig. 2; CL8, L47-57; Fig 11; CL9, L55 to CL10, L3); and

a graphical user interface which displays the trend report (Fig 11; CL9, L55 to CL10, L3).

Per Claims 13 and 19-21, these are rejected based on the same reasoning as Claims 2 and 8-10, as shown above. Claims 13 and 19-21 are system claims reciting the same limitations as Claims 2 and 8-10, using the processor as the means.

6.3 As per Claim 23, it is a method claim based on Claim 1, reciting all the limitations of Claim 1 and in addition specifying the limitation:

collecting a plurality of data parameters from the communication device.

EN teaches collecting a plurality of data parameters from the communication device (CL8, L22-25). EN teaches all other limitations as indicated in Paragraph 6.1 above.

Per Claims 24 and 30-32, these are rejected based on the same reasoning as Claims 2 and 8-10, as shown above. Claims 24 and 30-32 are method claims reciting the same limitations as Claims 2 and 8-10, as taught through out by **Engel et al.**

6.4 As per Claim 34, it is a computer medium claim based on Claim 12, reciting all the limitations of Claim 12 except the following limitations of claim 12:

a data poller, wherein the data poller collects a plurality of data parameters from the communication device; and

a database which stores the data parameters.

Engel et al. teaches all the limitations of this claim as indicated in Paragraph 6.2 above.

The limitations not included in this claim are inherent in the claim.

Per Claim 35, this is rejected based on the same reasoning as Claim 2, as shown above. Claim 35 is a computer medium claim reciting the same limitation as Claim 2, as taught through out by **Engel et al.**

6.5 As per Claim 36, **Engel et al.** teaches a method for determining and predicting; performance of a communication device (CL1, L54 to CL2, L5; CL2, L14-29; CL9, L5-6); the method comprising the steps of:

retrieving a plurality of selected data parameters from a communication device, such that the plurality of selected data parameters corresponds to a plurality of summary periods (CL8,

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L20-25; CL9, L2-6); and wherein each summary period corresponds to a plurality of days of interest (CL8, L20-22) and to a portion of the days of interest, and wherein the portion is less than a day (CL5, L8-15; CL6, L13-21); and selected by the times of the day that are of interest (CL2, L32-39; CL5, L8-15; CL6, L13-21);

processing the plurality of selected data parameters into a plurality of performance parameters corresponding to actual performance of the communication device during each of the summary periods (CL1, L54 to CL2, L5; CL2, L32-39; Fig. 2; CL5, L56-59; CL5, L8-15);

trending the plurality of performance parameters into a plurality of trend parameters to predict future performance of the communication device (CL9, L5-6; CL9, L16-54; Fig 11; CL9, L55 to CL10, L3); and

recommending a performance configuration for the communication device based upon the trend parameters (CL2, L21-29; Fig 11; CL9, L55 to CL10, L3; it is inherent that the network administrator will use the days to reach a preset threshold of a parameter of interest such as capacity utilization, to determine when and how much the network resources should be augmented and how the network should be reconfigured to support the changing patterns of usage and greater user demand).

6.6 As per Claim 37, **Engel et al.** teaches a system for determining and predicting performance of a communication device (CL1, L54 to CL2, L5; CL2, L14-29; CL9, L5-6); comprising:

a user interface, wherein a user specifies a report period, the report period corresponding to a reporting period of interest (CL2, L14-29; CL8, L20-23; CL9, L2-6; reporting period =

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baseline period = 3-6 weeks); and the user specifies a plurality of summary periods, each summary period corresponding to a different portion of the reporting period (CL1, L54 to CL2, L5; CL2, L32-39; CL5, L8-15; CL6, L13-21; summary period = preselected period = e.g., a day); and wherein each summary period corresponds to a plurality of days of interest (CL8, L20-22) and to a portion of the days of interest, and wherein the portion is less than a day (CL5, L8-15; CL6, L13-21); and specified by the times of the day that are of interest (CL2, L32-39; CL5, L8-15; CL6, L13-21); and

a processor, wherein the processor detects a plurality of selected data parameters from the communications device such that the plurality of selected data parameters corresponds to the plurality of summary periods (CL8, L25-34; CL8, L37-38; CL8, L47-58); and wherein the processor processes the plurality of selected data parameters into a plurality of performance parameters which correspond to actual performance of the communication device during each of the summary periods (CL1, L54 to CL2, L5; CL2, L32-39; Fig. 2; CL5, L56-59; CL5, L8-15); and wherein the processor trends the plurality of performance parameters into a plurality of trend parameters to predict future performance of the communication device (CL9, L5-6; CL9, L16-54; Fig 11; CL9, L55 to CL10, L3); and wherein the processor recommends a performance configuration for the communication device based upon the plurality of trend parameters (CL2, L21-29; Fig 11; CL9, L55 to CL10, L3; it is inherent that the network administrator will use the days to reach a preset threshold of a parameter of interest such as capacity utilization, to determine when and how much the network resources should be augmented and how the network should be reconfigured to support the changing patterns of usage and greater user demand).

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6.7 As per Claim 38, it is a system claim based on Claim 13 (when claim 12 limitations are read into claim 13), reciting all the limitations of Claim 13.

This claim uses “means for” for specifying the components of the system, while Claim 12 lists the individual components. **Engel et al.** teaches all the limitations of this claim as indicated in Paragraph 6.2 above.

6.8 As per Claim 39, it is a method claim based on Claim 38.

Engel et al. teaches all the limitations of this claim as indicated in Paragraph 6.2 above.

6.9 As per Claim 40, **Engel et al.** teaches a transmitter (Fig. 1); comprising:

a user interface, wherein a user specifies a report period, the report period corresponding to a reporting period of interest (CL2, L14-29; CL8, L20-23; CL9, L2-6; reporting period = baseline period = 3-6 weeks); and the user specifies a plurality of summary periods, each summary period corresponding to a different portion of the reporting period (CL1, L54 to CL2, L5; CL2, L32-39; CL5, L8-15; CL6, L13-21; summary period = preselected period = e.g., a day); and wherein each summary period corresponds to a plurality of days of interest (CL8, L20-22) and to a portion of the days of interest, and wherein the portion is less than a day (CL5, L8-15; CL6, L13-21); and specified by the times of the day that are of interest (CL2, L32-39; CL5, L8-15; CL6, L13-21);

a processor, wherein the processor retrieves a plurality of selected data parameters from the database such that the plurality of selected data parameters corresponds to the plurality of summary periods (CL8, L25-34; CL8, L37-38; CL8, L47-58); and wherein the processor

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processes the plurality of selected data parameters into a plurality of performance parameters which correspond to actual performance of the communication device during each of the summary periods (CL1, L54 to CL2, L5; CL2, L32-39; Fig. 2; CL5, L56-59; CL5, L8-15); and wherein the processor trends the plurality of performance parameters into a plurality of trend parameters to predict future performance of the communication device (CL9, L5-6; CL9, L16-54; Fig 11; CL9, L55 to CL10, L3);

and wherein the processor recommends a performance configuration for the communication device based upon the plurality of trend parameters (CL2, L21-29; Fig 11; CL9, L55 to CL10, L3; it is inherent that the network administrator will use the days to reach a preset threshold of a parameter of interest such as capacity utilization, to determine when and how much the network resources should be augmented and how the network should be reconfigured to support the changing patterns of usage and greater user demand); and

a data presentation module, the module presents the plurality of processed performance parameters and the plurality of trend parameters in a trend report (CL1, L54 to CL2, L5; CL2, L27-29; CL8, L47-57; Fig 11; CL9, L55 to CL10, L3).

6.10 As per Claim 41, it is a device claim for the receiver having the same limitations as Claim 40, a device claim for the transmitter. **Engel et al.** teaches all the limitations of this claim as indicated in Paragraph 6.9 above.

Claim Rejections - 35 USC § 103

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7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains.

8. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

9. Claims 3, 14 and 25 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Engel et al.** (U.S. Patent 6,320,585) in view of **VanDervort** (U.S. Patent 5,699,346).

9.1 As per Claim 3, **Engel et al.** teaches the system of Claim 1. **Engel et al.** does not expressly teach per claim 3, that at least one of the plurality of data parameters is a burst statistic. **VanDervort** teaches that at least one of the plurality of data parameters is a burst statistic (Abstract, L1-2; CL1, L27-30; CL4, L50-56), as burst rate and burst size statistics are useful in determining how much network throughput beyond the limits of the network can be sold to the subscribers (CL4, L50-56). It would have been obvious to one of ordinary skill in the art at the time of Applicant's invention to modify the system of **Engel et al.** with the system of

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VanDervort that included at least one of the plurality of data parameters as a burst statistic, as burst rate and burst size statistics would be useful in determining how much network throughput beyond the limits of the network could be sold to the subscribers.

9.2 As per Claims 14 and 25, these are rejected based on the same reasoning as Claim 3 as shown above. Claims 14 and 25 are system and method claims reciting the same limitations as Claim 3, as taught through out by **Engel et al.** and **VanDervort**.

10. Claims 4-7, 15-18 and 26-29 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Engel et al.** (U.S. Patent 6,320,585) in view of **VanDervort** (U.S. Patent 5,699,346), and further in view of **Grevious** (U.S. Patent 6,167,310).

10.1 As per Claim 4, **Engel et al.** and **VanDervort** teach the system of Claim 3. **Engel et al.** does not expressly teach a means for specifying the number of the plurality of burst ranges. **Grevious** teaches a means for specifying the number of the plurality of burst ranges (CL24, L1-19), as that allows controlling the total energy of the data bursts by adjusting the burst range (CL24, L2-5). It would have been obvious to one of ordinary skill in the art at the time of Applicant's invention to modify the system of **Engel et al.** with the system of **Grevious** that included a means for specifying the number of the plurality of burst ranges, as that would allow controlling the total energy of the data bursts by adjusting the burst range.

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10.2 As per Claim 5, **Engel et al.** and **VanDervort** teach the system of Claim 3. **Engel et al.** teaches a means for specifying the percentage range for preselected performance variable (CL1, L64 to CL2, L5; Fig 6; Fig 8; CL6, L30-36), as that allows determining for what proportion of the preselected period, the values of the preselected performance variable falls within that subrange and displaying in graphical form, the proportion of the preselected period of time that the values of the preselected performance variable fell within that range (CL1, L64 to CL2, L5). **Engel et al.** does not expressly teach a means for specifying the percentage range for each one of the plurality of burst ranges.

Grevious teaches a means for specifying the number of the plurality of burst ranges (CL24, L1-19), as that allows controlling the total energy of the data bursts by adjusting the burst range (CL24, L2-5). It would have been obvious to one of ordinary skill in the art at the time of Applicant's invention to combine the system of **Engel et al.** that included a means for specifying the percentage range for preselected performance variable with the system of **Grevious** that included specifying the number of the plurality of burst ranges, as that would allow determining for what proportion of the preselected period, the values of the burst range fell within that subrange and displaying in graphical form, the proportion of the preselected period of time that the values of the burst range fell within that range.

10.3 As per Claim 6, **Engel et al.** and **VanDervort** teach the system of Claim 3. **Engel et al.** teaches that the processing means further comprises bandwidth utilization trending means which predicts future performance of the communication device relative to each bandwidth utilization range (CL9, L5-6; CL9, L16-54; Fig. 11), as that facilitates prediction of a time to reach a

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threshold number for bandwidth utilization (CL2, L 22-29). **Engel et al.** does not expressly teach the processing means further comprises a burst range trending means which predicts future performance of the communication device relative to each burst range.

Grevious teaches a means for specifying the number of the plurality of burst ranges (CL24, L1-19), as that allows controlling the total energy of the data bursts by adjusting the burst range (CL24, L2-5). It would have been obvious to one of ordinary skill in the art at the time of Applicant's invention to combine the system of **Engel et al.** that included the processing means further comprising preselected performance variable trending means which predicts future performance of the communication device relative to each preselected performance variable range with the system of **Grevious** that included specifying the number of the plurality of burst ranges, as that would facilitate prediction of a time to reach a threshold number for each burst range.

10.4 As per Claim 7, **Engel et al.**, **VanDervort** and **Grevious** teach the system of Claim 6. **Engel et al.** does not expressly teach that at least one of the plurality of burst ranges is a total burst range corresponding to the total number of all bits transmitted during each of the plurality of summary periods. **VanDervort** teaches that at least one of the plurality of burst ranges is a total burst range (burst size) corresponding to the total number of all bits transmitted during each of the plurality of summary periods (CL4, L50 to CL5, L4), as that enables the service provider to determine that the user properly subscribed his virtual connection and to determine how much network throughput can be sold to the subscribers (CL4, L50-62).

It would have been obvious to one of ordinary skill in the art at the time of Applicant's invention to modify the system of **Engel et al.** with the system of **VanDervort** that included at least one of the plurality of burst ranges being a total burst range corresponding to the total number of all bits transmitted during each of the plurality of summary periods, as that would enable the service provider to determine that the user properly subscribed his virtual connection and to determine how much network throughput could be sold to the subscribers.

10.5 As per Claims 15-18 and 26-29, these are rejected based on the same reasoning as Claims 4-7 as shown above. Claims 15-18 and 26-29 are system and method claims reciting the same limitations as Claims 4-7, as taught through out by **Engel et al.**, **VanDervort** and **Grevious**.

11. Claims 11, 22 and 33 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Engel et al.** (U.S. Patent 6,320,585) in view of **Colmant et al.** (U.S. Patent 6,144,662).

11.1 As per Claim 11, **Engel et al.** teaches the system of Claim 2. **Engel et al.** does not expressly teach that the performance rating corresponds to a port speed of a port residing in the communications device, wherein the port speed corresponds to the rate at which data is transmitted through the port. **Colmant et al.** teaches that the performance rating corresponds to a port speed of a port residing in the communications device, wherein the port speed corresponds to the rate at which data is transmitted through the port (CL4, L10-12; CL1, L48), as high port speed provides a high packet throughput (CL2, L32).

It would have been obvious to one of ordinary skill in the art at the time of Applicant's invention to modify the system of **Engel et al.** with the system of **Colmant et al.** that included the performance rating corresponding to a port speed of a port residing in the communications device, wherein the port speed corresponded to the rate at which data would be transmitted through the port, as high port speed would provide a high packet throughput.

11.2 As per Claims 22 and 33, these are rejected based on the same reasoning as Claim 11 as shown above. Claims 22 and 33 are system and method claims reciting the same limitations as Claim 11, as taught through out by **Engel et al.** and **Colmant et al.**

Response to Arguments

12. Applicant's arguments filed on June 6, 2005 have been fully considered. Applicant's arguments with respect to claim rejections under 35 USC 102 (e) and 103 (a) are not persuasive.

12.1 As per the Applicant's argument that "Engel et al. does not disclose, teach, or suggest the feature of a "means for presenting and displaying each of said plurality of performance parameters in association with the corresponding summary period" as recited in amended claim 1; Engel et al. does not disclose, teach, or suggest the feature of "a data presentation module, wherein said module presents each of said plurality of processed performance parameters in association with the corresponding summary period" as recited in amended claim 12; Engel et al, does not disclose, teach, or suggest the feature of "presenting each of said plurality of processed

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performance parameters in association with the corresponding summary period" as recited in amended claims 23 and 34", the Examiner takes the position that the Applicant has not described the corresponding summary period associated with each of the plurality of performance parameters anywhere in his specification. The Examiner has interpreted this to mean same summary period for each of the plurality of performance parameters.

Engel et al. teaches means for presenting and displaying each of the plurality of performance parameters in association with the corresponding summary period (CL1, L54 to CL2, L5; CL2, L32-39; Fig. 2; CL5, L8-15; CL7, L56-59).

Engel et al. teaches a data presentation module, wherein the module presents each of the plurality of processed performance parameters in association with the corresponding summary period and the plurality of trend parameters in a trend report (CL1, L54 to CL2, L5; CL2, L27-29; Fig. 2; CL8, L47-57; Fig 11; CL9, L55 to CL10, L3).

Engel et al. teaches presenting each of the plurality of performance parameters in association with the corresponding summary period (CL1, L54 to CL2, L5; CL2, L27-29; Fig. 2; CL8, L47-57; Fig 11; CL9, L55 to CL10, L3).

12.2 As per the Applicant's argument that "in order to disclose the claimed feature "displaying each of said plurality of performance parameters in association with the corresponding summary period," the chart in Engel et al. must show utilization for each summary period within the "relevant period of time," which is a day in FIG. 2; importantly, however, this chart does not display utilization for time periods within the day; that is, the chart does not show utilization

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between 10-11 AM, 11-12 AM, etc.; what the chart shows, instead, is that LAN segment 1 was less than 10% utilized for about 65% of the day, and 10-20% utilized the for about 30% of the day; the chart does not show for which particular portion of the day the segment was 10% utilized, and so is not equivalent to a display of the utilization performance parameter for a particular summary period in association the corresponding report period”, the examiner respectfully disagrees.

As explained in Paragraph 3 above, the applicant has not described anywhere in the specification what the corresponding summary period associated with each of said plurality of performance parameters is. Therefore, the examiner has interpreted this to mean same summary period for each of the performance parameters. The applicant has not shown the burst related data for different periods within his summary period of Monday through Friday, 8:00 AM till 5:00 PM. Therefore, the Examiner is not required to show utilization for time periods within the day; that is, utilization between 10-11 AM, 11-12 AM, etc.

The examiner has shown that Engel teaches that polling takes place at periodic intervals of 15 minutes (CL6, L61-62); the summarizing of the data takes place at preselected time which is e.g., one day (CL1, L54-62; CL2, L32-39; Fig. 2; CL5, L8-15; CL6, L13-21); the utilization statistics are collected throughout the day (CL5, L8-15). The reporting period is of the order of 3-6 weeks (CL2, L14-29; CL8, L20-23; CL9, L2-6; reporting period = baseline period = 3-6 weeks).

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12.3 As per the Applicant's argument that "There is no specific teaching in Engel et al. of how a user specifies a report period or a plurality of summary periods to be used in generating the stacked bar chart; ... the term "preselected period" suggests that a user specifies a time period for bandwidth utilization display, for example, a particular day; however, this would correspond to a single report period, not to multiple summary periods; Engel et al. does not disclose, teach, or suggest that a user specifies multiple summary periods within the report period displayed in the stacked bar chart; Even if the polling period in Engel et al, corresponds to a summary period, and even if Engel et al. suggests that the polling period can be specified by the user, this would correspond to a user specifying a single summary period within the one-day report period; there is no reason in Engel et al. for the user to specify multiple summary periods, since the stacked bar chart does not differentiate between different intra-day periods", the examiner respectfully disagrees.

The examiner has shown that Engel teaches that polling takes place at periodic intervals of 15 minutes (CL6, L61-62); the summarizing of the data takes place at preselected time which is e.g., one day (CL1, L54-62; CL2, L32-39; Fig. 2; CL5, L8-15; CL6, L13-21; it is inherent that the user will use different days to collect such performance data for trend analysis as shown in Fig. 11; therefore, this will correspond to multiple summary periods); the utilization statistics are collected throughout the day (CL5, L8-15). The reporting period is of the order of 3-6 weeks (CL2, L14-29; CL8, L20-23; CL9, L2-6; reporting period = baseline period = 3-6 weeks).

12.4 As per the Applicant's argument that "Engel et al. does not disclose, teach, or suggest the feature of "recommending a performance configuration for the communication device based

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upon said plurality of trend parameters" as recited in amended claims 36, 37, 38, 39, 40, and 41; Engel et al. discloses using the collected performance data to compute of a "days-to-threshold" value, which is a predicted future time when bandwidth utilization for a particular LAN segment will reach a specific value; however, this prediction is not a recommendation, and the predicted value is not a "performance configuration for the communication device"; therefore, Engel et al. does not anticipate amended claims 36, 37, 38, 39, 40, and 41", the examiner respectfully disagrees.

Engel teaches recommending a performance configuration for the communication device based upon the trend parameters (CL2, L21-29; Fig 11; CL9, L55 to CL10, L3). It is inherent that the network administrator will use the days to reach a preset threshold of a parameter of interest such as capacity utilization, to determine when and how much the network resources should be augmented and how the network should be reconfigured to support the changing patterns of usage and greater user demand.

Conclusion

13. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dr. Kandasamy Thangavelu whose telephone number is 571-272-3717. The examiner can normally be reached on Monday through Friday from 8:00 AM to 5:30 PM.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Leo Picard, can be reached on 571-272-3749. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to TC 2100 Group receptionist: 571-272-2100.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

A handwritten signature in black ink, appearing to read 'K. Thangavelu', with a stylized flourish at the end.

K. Thangavelu
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July 23, 2005